THE LIFESCIENCES MAGAZINE

The Most Successful Leader in HealthTech Industry - 2023

The Most
SUCCESSFUL LEADER
In Healthtech Industry - 2023

Articles

Tips for a Healthy Heart Diet
Conquering Cholesterol

The Different Skin
Benefits of Azelaic Acid

HAMZA BATTERJEE
President & CEO
Megamind IT Solutions

Pioneering Excellence in

HEALTHTECH LEADERSHIP

THE LIFESCIENCES MAGAZINE

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FROM EDIT

TOR'S DESK

Expertise, Foresight, and Compassion!

Dear Esteemed Readers,

Welcome to a special edition of our magazine, dedicated to profiling *"The Most Successful Leader in HealthTech Industry - 2023."* In this issue, we delve into the dynamic realm of healthcare technology to spotlight the visionaries shaping the future of global health.

The HealthTech industry stands at the forefront of innovation, catalyzing transformative changes in healthcare delivery and patient outcomes. In our pursuit of identifying the most successful leader in this rapidly evolving landscape, we have encountered inspiring stories, groundbreaking initiatives, and exemplary leadership.

As we navigate through the pages of this issue, you will encounter in-depth interviews, insightful analyses, and thought-provoking perspectives on the individual who has emerged as the beacon of success in the HealthTech realm. This leader's journey is not only a testament to their personal achievements but also a reflection of the industry's collective triumphs and challenges.

HealthTech, an amalgamation of healthcare and technology, demands leaders who possess a unique blend of expertise, foresight, and compassion. The symbiotic relationship between these two domains necessitates individuals who can bridge the gap between traditional healthcare practices and cutting-edge technological solutions. Our chosen leader embodies these qualities, illustrating how a strategic vision can redefine the contours of an entire industry.

As we celebrate the success stories within the HealthTech industry, we must also acknowledge the challenges and ethical considerations that accompany such rapid advancements. The interplay between innovation and responsibility is a central theme in our exploration, emphasizing the importance of ethical leadership in steering the course of technological progress.

On the cover, we have featured **Hamza Batterjee, the President and CEO of Megamind IT Solutions.** With a career path marked by consistent strides in entrepreneurship, innovation, and disciplined leadership, Hamza has been an architect of progress, propelling companies, employees, and partners to new heights.

Have a compelling read!

Utkarsh D.

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This list is NOT a ranking. The companies on listed in magazine serve different aspects of the market, making ranking them in any order except revenue impossible and unfair. We try to bring a perfect platform for business organization to showcase their valued products/ services.

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LEADERS IN SPOTLIGHT

On the cover of this magazine issue, we have featured Hamza Batterjee, the President and CEO of Megamind IT Solutions. With a career path marked by consistent strides in entrepreneurship, innovation, and disciplined leadership, Hamza has been an architect of progress, propelling companies, employees, and partners to new heights.

Hamza's career path has consistently propelled companies, employees, and partners to new heights, marked by entrepreneurship, innovation, and disciplined leadership. Having navigated various facets of the business, Hamza possesses a deep understanding of both its operational and departmental functions. With a Global Business Management degree from Regent Business School, London, he is a meticulous numbers observer with keen attention to detail. Central to his leadership philosophy is a strong customer-centric approach, driving decisions and actions across Megamind and fostering an open, innovative, and empowered organizational culture.

Hamza invests significant effort in addressing various dimensions of the company's short- and long-term business goals. One of his primary responsibilities is to understand where the healthcare industry sees value in technological investments and then lead the design of products, services, and experiences that deliver this value. He is also focused on devising efficient methods to stabilize and improve technology, which sometimes involves breaking new ground in technology implementations.

In addition, Hamza leads efforts to identify the necessary capabilities the company needs to enhance innovation and control costs effectively. His role extends to guiding healthcare leaders in creating value through technology and shaping the evolving technological landscape's impact on health and care. Moreover, he is dedicated to attracting and retaining employees in a dynamic labor market, ensuring the company can adapt to workforce changes.

CONTENTS

COVER STORY

12 Hamza Batterjee

ARTICLES

22 Tips for a Healthy Heart Diet Conquering Cholesterol

ALTERNATIVE THERAPIES

28 Homeopathy Medicines - Instant Relief from Acute Injury Pain

THE 'NOBLE' WINNERS

34 How Svante Pääb revolutionized the way we Understood Human Race?

ARTICLES

42 The Different Skin Benefits of Azelaic Acid

ICY HOT PRO
PAIN RELIEF CREAM
Pain relief isn't just for pros

s.

Hamza

Batterjee

Pioneering Excellence in HealthTech Leadership

Megamind IT Solutions

Hamza Batterjee

President/CEO at Megamind IT Solutions

The HealthTech industry is evolving, courtesy of leaders leaving a profound impact. These leaders have been instrumental in shaping the growth and dynamics of the industry. Their leadership, characterized by a commitment to excellence and a relentless pursuit of groundbreaking solutions, has not only redefined the Industry but also reimagined the future of healthcare technology.

At the forefront of these trailblazers stands **Hamza Batterjee**, the **President and CEO** of **Megamind IT Solutions.** With a career path marked by consistent strides in entrepreneurship, innovation, and disciplined leadership, Hamza has been an architect of progress, propelling companies, employees, and partners to new heights. As Hamza envisions Megamind's future, he epitomizes a leader committed to driving the company into the vanguard of digital transformation, leaving an indelible mark that will shape the future of healthcare technology.

Professional Journey

Hamza's career path has consistently propelled companies, employees, and partners to new heights, marked by entrepreneurship, innovation, and disciplined leadership. Having navigated various facets of the business, Hamza possesses a deep understanding of both its operational and departmental functions. With a Global Business Management degree from Regent Business School, London, he is a meticulous numbers observer with keen attention to detail. Central to his leadership philosophy is a strong customer-centric approach, driving decisions and actions across Megamind and fostering an open, innovative, and empowered organizational culture.

Propelling Megamind’s Success

Megamind IT Solutions, established in 2018, initially began as a dedicated digital IT solution provider with a small team managing an in-house Hospital Information System (HIS). In the subsequent year, Megamind expanded its horizons by setting up a software development company in Manila, Philippines, and initiated the operation of an Oracle ERP (eBusiness) team. The company also successfully established itself as a key player in IT infrastructure and enterprise software projects, catering to clients across the Kingdom of Saudi Arabia and the United Arab Emirates.

A pivotal moment in Megamind's journey occurred in 2020 when the company sent out a significant tender for the outsourcing of IT services for Saudi German Hospitals in Saudi Arabia. This tender garnered responses from multiple participants and marked the beginning of a new phase characterized by long-term contracts (LTC). Winning the tender in 2021 was a significant milestone that expanded Megamind's capabilities from IT project management to comprehensive IT outsourcing, covering multiple hospitals.

Following this success, Megamind secured hospital contracts in Egypt and undertook hospital projects in the UAE. The company's reputation for excellence and innovation led to further victories in winning bids with medical universities. Today, Megamind has accomplished hundreds of IT projects and provides IT services to numerous hospitals, collectively offering over 6,000 beds, solidifying its position as a trusted and leading player in the healthcare IT sector.

Hamza attributes his success to the commitment of Megamind's employees, treating them as an extended family and emphasizing staff retention and development. He envisions Megamind as a leader in digital transformation in the healthcare business, committed to upholding excellence in the future.

Key Responsibilities

Hamza invests significant effort in addressing various dimensions of the company's short- and long-term business goals. One of his primary responsibilities is to understand where the healthcare industry sees value in technological investments and then lead the design of products, services, and experiences that deliver this value. He is also focused on devising efficient methods to stabilize and improve technology, which sometimes involves breaking new ground in technology implementations.

In addition, Hamza leads efforts to identify the necessary capabilities the company needs to enhance innovation and control costs effectively. His role extends to guiding healthcare leaders in creating value through technology and shaping the evolving technological landscape's impact on health and care. Moreover, he is dedicated to attracting and retaining employees in a dynamic labor market, ensuring the company can adapt to workforce changes.

Hamza sees his responsibility as an integrator as crucial in setting a clear direction, aligning the company, managing stakeholders, and serving as the "Chief Empowering Officer." Building Megamind into a successful business powerhouse has demanded substantial energy and dedication, requiring him to be the driving force behind the company's transformation.

As he continues this journey, Hamza is prompted to consider three critical questions:

- What is the one (or, at most, two) superpower in Health Care Tech that will determine Megamind's success over the next three to five years?
- Are the top team members aligned around this superpower, envisioning what it needs to become?
- Does the company's capability-building effort extend deeply enough on each dimension to establish something differentiated and sustainable?

Efficient Leadership Processes

Hamza has implemented a set of distinct mindsets and practices. The institutional capabilities of the company are divided into two key categories: Functional, encompassing core daily activities such as sales, supply chain management, and performance marketing, which covers strengths that span the entire company, including speed of decision-making, agility in innovation, interoperability, and customer-centricity.

To achieve efficiency and success, Megamind places a strong emphasis on VELOCITY, an acronym representing critical elements:

- **Vision:** Framing what winning means for the company.
- **Employees:** Committing to the journey and driving it unwaveringly.
- **Leadership:** A relentless commitment to the superpower's development.
- **Organization:** Continuous adaptation and evolution.
- **Culture:** Fostering a culture of innovation and growth.
- **Innovation:** Staying at the leading edge of industry developments.
- **Technology:** Leveraging the latest technology for advantage.
- **Yield:** Achieving desired outcomes and results.

Megamind goes beyond setting financial targets; the company outlines a vision for what it wants to be known for in its industry, emphasizing bold moves and proactive resource allocation. The company values teamwork, unbiased decision-making, and collaborative management processes. It also prioritizes fostering effective relationships with external stakeholders, shaping a forward-looking agenda, and seeking a balanced development of capabilities. Furthermore, Megamind focuses on matching talent to value, going beyond employee engagement to cultivate a unique company culture, and combining agility with stability in design. These approaches collectively contribute to the company's enduring success and growth.

Drive Into Healthcare Technology

Hamza found his inspiration to venture into the healthcare technology industry by recognizing the immense transformative potential of the industry. He understood that health technology was continuously pushing the boundaries of healthcare delivery and had the potential to revolutionize the understanding of diseases.

For Megamind, the healthcare and technology sectors offered significant growth prospects, particularly in technology-enabled services that aimed to enhance patient care and operational efficiency. The industry witnessed the emergence of new models, players, and approaches across various sub-segments, fostering innovation and integration. In areas such as data and analytics, utilization management, provider enablement, network management, and clinical information systems, innovation and integration were thriving. This environment presented an opportunity to integrate innovative technologies and revamp existing healthcare business models, focusing on improving well-being and holistic health support.

MEGAMIND
IT Solutions

Hamza's foresight led him to understand the evolving role of technology in the life sciences sector, emphasizing the importance of addressing the unmet needs of healthcare stakeholders. Effective digital health solutions need to be meticulously designed for end-users, including patients, caregivers, healthcare providers, and payers. While innovative technology played a crucial role, Hamza recognized that success in the digital health industry depended on identifying and meeting the specific needs of stakeholders.

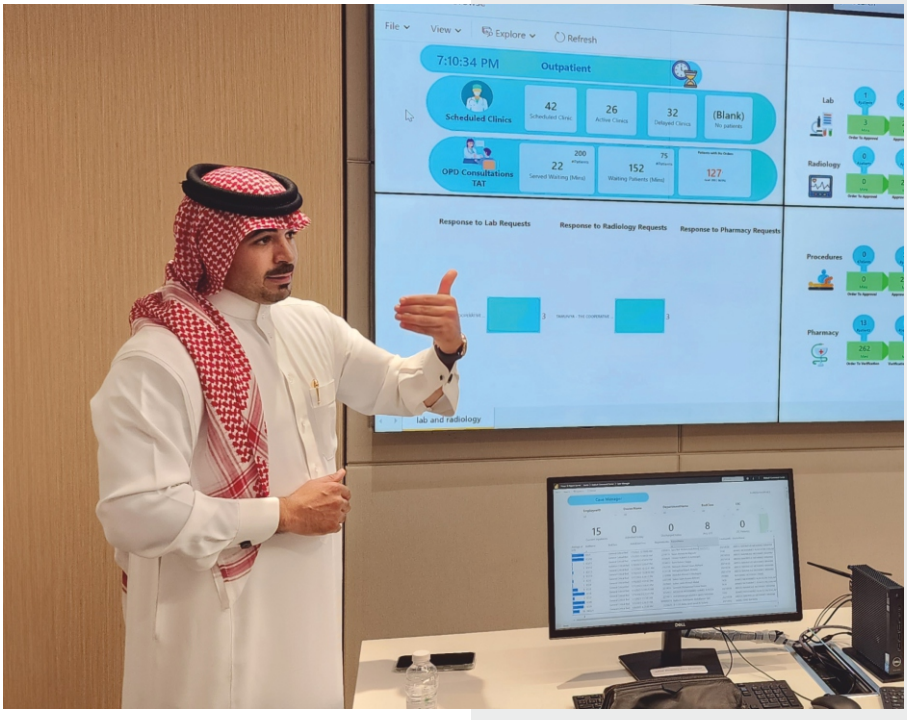
With a strong conviction that digital health is the future and an increasingly critical driver of healthcare improvement, Hamza saw digital health as a substantial opportunity to capture value and offer innovative solutions to enhance the healthcare landscape.

Guiding the Team

Hamza adheres to a distinctive leadership philosophy emphasizing the essential fusion of leadership and technology. His leadership principles are deeply rooted in four core tenets: insight, integrity, courage, and agility, all essential for navigating the fast-evolving landscape of technology and associated businesses.

Insight: Within the company's culture, there is a strong emphasis on discipline, concentration, and relentless pursuit of value. The team is purposefully cultivated to possess a keen sense of what truly matters and the ability to identify continuous sources of opportunity aligned with their objectives. Hamza instinctively understands the areas of performance that can drive rapid transformation, focusing on factors like technology uptime, healthcare demand trends, and digital performance.

Integrity: Amid significant transformations, Hamza ensures that the company builds high-integrity teams that remain steadfast in pursuing their stated goals, whether related to innovation or productivity. This commitment to the company's values and consistency fosters deep wells of confidence and trust, both within the team and with external stakeholders. Hamza leads by example,



> ***"To organize ourselves for a better future, we should embrace the imperatives that will define 'who we are,' 'how we operate,' and 'how we grow,'"*** **Hamza emphasizes.**

demonstrating personal generosity, humility, and a genuine sense of duty to his team members, akin to a family head.
Courage: While many organizations eventually gravitate towards improved ideas, what sets Megamind apart is the speed of execution. Hamza and his team bridge the gap between recognizing a promising concept and swiftly implementing it at scale. They are unafraid to take bold, informed risks and persist in facing challenges, propelling the company forward. This approach aligns with the principle of choosing the "harder right" over the "easier wrong."

Agility: Hamza and his team recognize that the world does not conform to a leader's strategy, so they maintain the humility, situational awareness, and organizational adaptability to respond to the ever-changing technological landscape. They combine flexibility with a disciplined ability to anticipate and navigate potential hurdles and opportunities. Like the Apollo flight crew, they are equipped to solve problems and adapt swiftly and continuously, ensuring the company's ongoing progress.

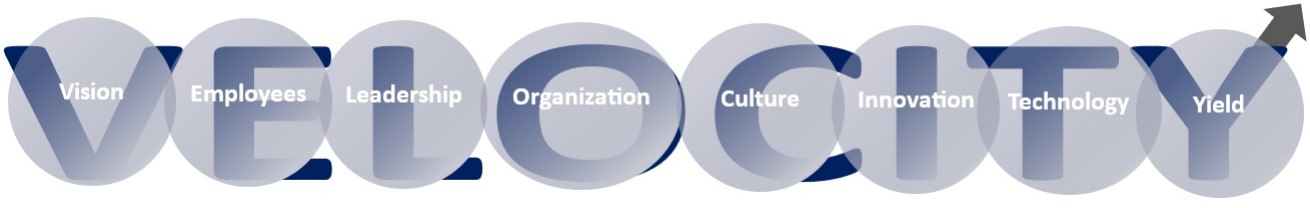
The Future of HealthTech

Hamza envisions a future characterized by exponential improvement in healthcare and transformative technology-driven innovations. These innovations are poised to reshape the healthcare landscape over the next 5-10 years, with a strong emphasis on improving patient understanding and delivering individualized care conveniently.

Several emerging technologies are at the forefront of this transformation, including targeted and personalized medicine, robotics, big data and analytics, artificial intelligence, and robotic process automation. These technologies hold the potential to revolutionize healthcare by enhancing how consumers access it, redefining care providers, and achieving better health outcomes. Integrating these technologies with an understanding of their value sources will be key to driving transformative change.

Hamza identifies four industry-level changes that could disrupt healthcare value pools significantly. These changes include modernized transaction and data infrastructure,

Hamza Batterjee



a more efficient medical supply chain, faster and more effective therapy development, and the creation of intuitive and personalized healthcare ecosystems. These ecosystems will revolve around patients and their families, integrating a community of medical and social caregivers to provide the right care at the right time

"To organize ourselves for a better future, we should embrace the imperatives that will define 'who we are,' 'how we operate,' and 'how we grow,'" Hamza emphasizes.
To realize these advancements, disruptors, and incumbents in the healthcare industry need to embrace technology, develop clear strategies for creating value, implement effective change management, and execute disciplined implementation plans. This era of technology-enabled disruption in healthcare is poised to deliver healthcare advances, improve affordability, and potentially deflate the cost of healthcare while ushering in new technological advancements.

Hamza also highlights the increasing consumer expectations for personalized, device-enabled, and convenient healthcare services available 24/7. Technology innovators are reshaping these expectations, with digitally enabled care at the heart of the health-tech transformation. Artificial intelligence will be crucial in clinical decision-making, care coordination, efficiency improvement, and workflow automation. Remote patient care through telehealth is already on the rise, and digital healthcare transformation presents opportunities for improving community social health through coaching and gamification.

Advice For Future Leaders

Hamza offers valuable advice to the leaders of tomorrow. He emphasizes the transformative potential of data, analytics, and artificial intelligence (AI) in driving innovation and scaling transformation within healthcare organizations. Digital transformation is a central platform triggering structural change in healthcare, and the pace of change is set to accelerate, making sound governance essential.

Corporate Strategy	Organizational Alignment	Teams & Processes	External Stakeholders
Vision frame what winning means	**Talent** match Talent to Value	**Teamwork** show resolve	**Effectiveness** promote a forward-looking agenda
Strategy make bold moves early	**Culture** go beyond employee engagement	**Decision** look out for biases	**Relationships** prioritize and shape
Resource allocation stay active	**Design** combine agility with stability.	**Management processes** ensure collaboration	**Capabilities** seek balance and development

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Hamza underscores the importance of getting it right in healthcare, an industry dealing with life-and-death situations and associated risks. With the advent of technology, leaders will have the opportunity to automate and eliminate various processes, demanding a deep understanding of how to harness this potential effectively. The cultural aspect of innovation also plays a significant role, with future leaders needing to foster an agile, risk-taking organization that constantly challenges itself and thinks differently about approaching challenges.

Developing an agile mindset becomes imperative, as leaders must continuously evaluate their organizational structures and streamline decision-making processes to keep up with the rapid changes the industry is witnessing. Hamza acknowledges that the dynamics of leadership in healthcare technology are as much about the institution as they are about individual leaders, emphasizing the need for proactive change and avoiding complacency in a fast-paced landscape.

To succeed and surpass the ever-rising bar for technological change, leaders must consider how transformations can not only achieve their intended outcomes but also set the stage for genuine competitive advantage. Four key elements—passion, perseverance, patience, and pace—should be inherent in their organizations to navigate constant disruption and change successfully while outsmarting the competition. Scale, collaboration, and a bold approach are essential in achieving these goals and thriving in the healthcare technology industry.

When antihistamines flop, the itch doesn't stop.
Ditch THE Itch
zoetis

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Tips for a Healthy Heart Diet

Conquering OLESTEROL

Increased cholesterol is the main reason for increasing heart attacks. We heard you ask for the cure for it. Simple. Concentrate on having a healthy heart diet. A term called bad cholesterol sticks to your blood vessels which creates fatty deposits there. It causes the narrowing of blood vessels that directly increases the risk of a stroke or a heart attack.

But, a healthy heart diet can curb this risk. A good lifestyle, normal eating habits, and no smoking or alcohol are the basic things to follow. Following a healthy heart diet is the best way to control cholesterol. Following a good diet along with some physical activity is beneficial for cardiac health.

Here Are 7 Tips for a Healthy Heart Diet:

1. Eat less cholesterol-inducing foods:

The recommended cholesterol intake is less than 200 mg per day. Delicacies of animal origin like livers, organ meats, and shrimp have cholesterol in them. Egg yolks and dairy products too carry cholesterol in them. A healthy heart diet would suggest having these items in a moderate quantity to ensure not exceeding the amount of recommended cholesterol intake.

2. Compensate with fibrous food:

Food that contains fiber can be counted on the list of healthy heart diets. Fiber that entices water and makes it into a gel during the digestion process is favorable for the body. Some foods that come into this category are:

1. **Oats:** Oats in any form are considered fibrous materials.
2. **Fruits:** Some fruits which provide us with fiber are apples, pears, bananas or oranges have an extensive amount of anti-oxidants and fiber in them to curb cholesterol.
3. **The pea family:** Chickpeas, lentils, kidney beans or peas, lima beans, or black-eyed peas are rich in fibrous materials.

3. Less salt:

One more way to a healthy heart diet is to limit salt. Again a recommendation. Not more than one tablespoon of salt should be eaten in a day. In milligrams, it is 2300. Sodium or salt intake should be limited to the said quantity only. Lessening salt doesn't directly help in reducing cholesterol, but it keeps you away from cardiac issues like heart strokes or heart diseases. Low salt helps to decrease blood pressure. A way to adapt to less salt is consuming no added salt or low salt seasonings on the food when preparing it.

4. Low alcohol:

To follow a healthy heart diet, a watch on the quantity of alcohol is necessary. Alcohol increases your bad cholesterol levels and decreases your good cholesterol levels. Resulting in heart issues. More alcohol increases your blood pressure and triglyceride levels. A small glass of wine, a single beer, or a single drink of hard drink won't harm. Quantities that exceed this are of trouble. Men can have two drinks of alcohol a day. While women can have one drink of alcohol in a day. Not more than that. Exceeding quantities give results as mentioned before.

5. Have fish rich in omega 3:

There are some fish rich in fatty acids omega-3 as they won't decrease bad cholesterol. On the contrary, they increase good cholesterol levels. It's a perfect way to follow a healthy heart diet. Fishes that have these properties are salmon, tuna, and mackerel. Consume them twice a week. It prevents blood clots and inflammation of the heart. The risk of heart attacks is also reduced. Study other fish which are good for health and if possible eat them too. It also depends on the availability of it, but try to include them in the diet at least twice a week.

6. Have cholesterol-friendly foods:

Some foods help you not increase cholesterol. Oats, beans, and nuts are some of them. Vegetable oils that help decrease low-density lipoprotein (LDL) are a boon. Using butter or lard is harmful to the heart. Instead use oils like sunflower, canola, or filtered groundnut oil. Also, be in a habit of cooking with less oil. Lesser the oil, the better the heart health. Eggplant, okra, citrus fruits, and soy also give the advantage of maintaining low cholesterol levels. Fatty fish helps lower cholesterol levels and are allowed to be consumed at least 2 to 3 times a day. These are way better than eating red meats or meats which have high cholesterol properties.

7. Foods extremely good for the heart:

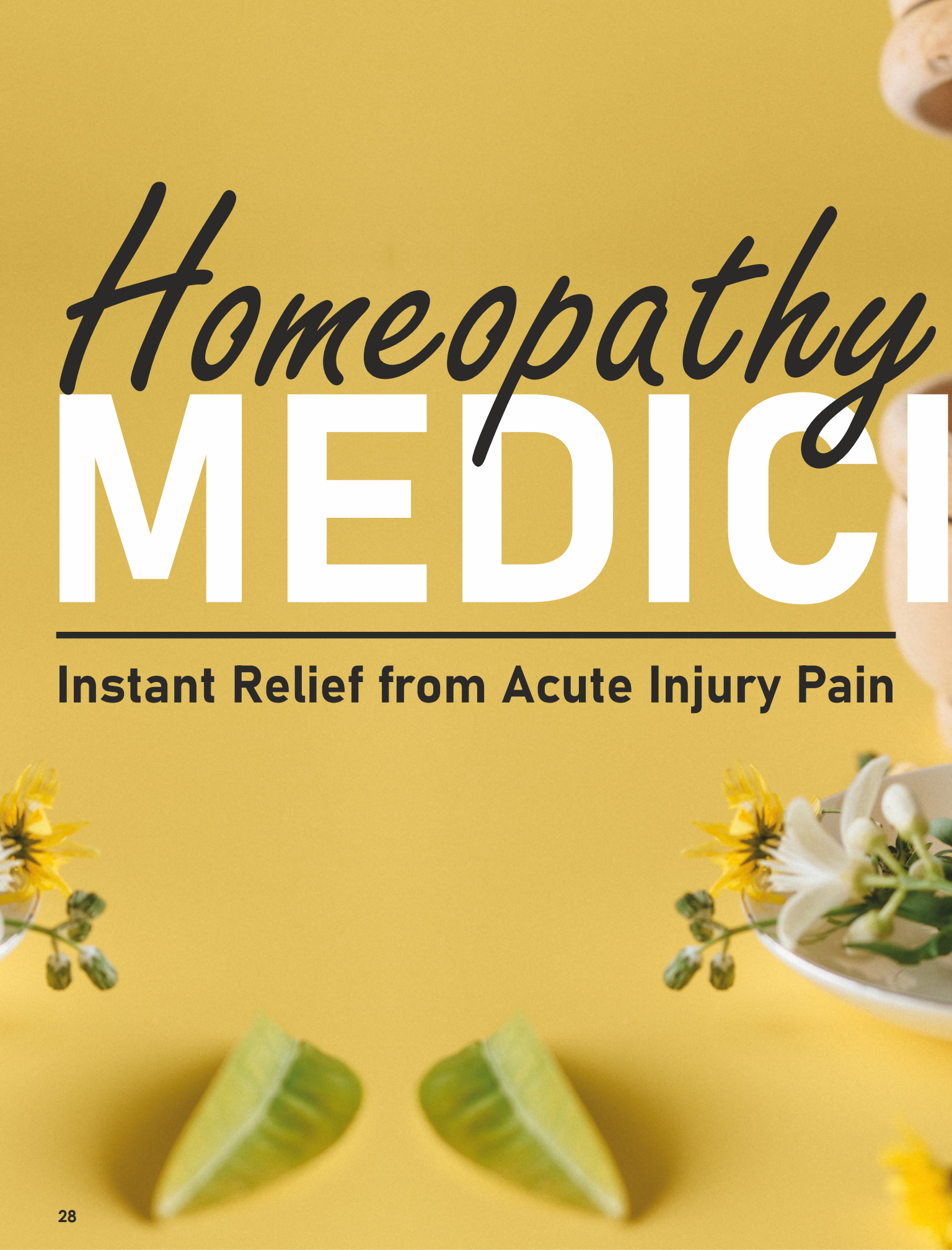
Green leafy vegetables, berries, walnuts, beans, avocados, and fatty fish and oils are some of the best foods to consume. Also, tomatoes, dark chocolate, and almonds are very good sources of lowering cholesterol levels. Garlic and some seeds are also an add-on. The properties present in garlic have good cholesterol capabilities which keep the heart healthy. This is a precious list of foods. If consumed these there's very less chance of you suffering from any cardiac ailments. Hereditary cases are exceptional. In general, fruits rich in fibrous materials and green vegetables are good. Green vegetables contain iron and zinc which improve heart health and purify blood.

Conclusion:
There is never-ending research on this topic. The more food items found that are good for heart health, the better it is for people. People should follow the mentioned items to lead a healthy life. Lower salt and alcohol consumption will lead to a positive change in the body. The recommended amount of both is good for the body. Our brain gets stimulated by a normal alcohol level and can think better, only if the recommended amount is followed. Losing control of alcohol and salt levels will cause cardiac issues and an unhealthy lifestyle.

Only taste it once.
TUMS

Homeopathy MEDICI

Instant Relief from Acute Injury Pain



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Have You Ever Taken Sago-sized Tablets For Small Diseases Like Viral Fever, Skin Infection, Constipation, Etc.?

Homeopathy medicines are ready to cure any severe disease with minimal side effects. It is based on the belief that our body can cure itself. Homeopathy medicines involve small content of plants and minerals which helps to stimulate the healing process. In this article, you will read about the basics of homeopathy, its side effects, and diseases that homeopathy can cure.

What is Homeopathy?

Being different from other conventional medicinal practices, homeopathy is treated as an alternate medicine. It has its origin in the 1790s in Germany where a doctor named Samuel Hahnemann developed ideas related to it. According to him, a substance that causes symptoms can also help to discard them.

Homeopathy works on another principle called succussion in which the more substance gets diluted, the greater power it has to cure the disease. Most homeopathy medicines comprise a substance that has been diluted in the water several times. In this way, homeopathy can treat a wide range of medical conditions from asthma to psychological disorders like depression.

Treat Several Diseases

As mentioned earlier, homeopathy remedies can cure any critical condition; many doctors ask for the family background to treat patients properly. It helps doctors to uproot the main cause of the disease.These remedies can treat the following cases:

- Asthma
- Arthritis
- Psychological cases such as depression, stress, and anxiety
- High fever
- Ear infections
- High blood pressure
- Any kind of allergies
- Skin Infections

Some homeopathy practitioners claim that they can cure malaria, typhoid, dengue, etc. however, there is no specific evidence available for it. Still, homeopathy medicines can prevent you from causing infection of such severe diseases. Some of them may help to cure childhood critical conditions like diarrhea, chronic fatigue, upper respiratory tract functions, etc. Some studies show there may be some role of homeopathy medicines in recovering mental and physical condition after going through chemotherapies, etc. They may help to improve the quality of life and make the patients feel better. However, it is not recommended that you can treat life-threatening diseases only with the help of homeopathy. You have to take the help of other medicines as well during such critical conditions.

Possibility of Side Effects

Homeopathy Medicines are considered to be safe and well tolerated except for small side effects like rashes on the skin. Some people have experienced its severity at the beginning of the treatment. Many physicians recommend remedies based on homeopathy for severe diseases as mentioned above, however, after proper guidance from a homeopath or any certified pharmaceutical company. There is a risk of homeopathic medicines that interfere with the action of other medicines.

No Scientific Evidence Available

There have been several studies conducted to achieve scientific evidence on the effectiveness of homeopathy. According to the research of 'The House of Commons Science and Technology Committee,' there is no proof that homeopathy can be effective as a treatment for any health condition. Furthermore, no evidence diluting and shaking certain substances in water can change their content into medicines. Also, there is no evidence that certain symptoms in our body can also help to cure the same symptom. Therefore, homeopathic ideas are not acceptable worldwide by mainstream science. They do not undergo the long-accepted physiological principles.

Similar to Over-the-Counter Drugs

In 1938, the U.S. Congress passed a law in which the USA government mentioned that homeopathy medicines will be regulated under Food and Drug Administration (FDA) department in the same way as OTC (Over-the-Counter) drugs. It means it is possible to buy homeopathic medicines without a doctor's prescription. Furthermore, homeopathic medicines do not have to undergo medical trials, unlike conventional prescription drugs. Conventional medicines have to bear the testing and safety review process of the FDA before they are launched in the market. They have to qualify for legal standards regarding quality, strength, purity, packaging, etc.

The guidelines elucidated for homeopathic medicines are mentioned in the Homeopathic Pharmacopoeia of the United States. It is written by homeopathic experts and representatives of a nongovernmental, nonprofit organization of industry. Pharmacopoeia mentioned provisions about testing upcoming remedies and verifying their clinical effectiveness. Although there are no diploma or certificate programs, there are homeopathic schools and training programs available that provide a license to practice and verify clinical effectiveness.

Some homeopaths are Medical Doctors (MDs) and they are licensed in every health condition category. If a person providing homeopathic health services is a licensed health professional then insurance companies are more likely to cover homeopathic treatments.

How Does Homeopathy Work?

Homeopathic medicines consist of basic ingredients for example herbs, minerals, or animal products. These substances are first dissolved or crushed in the liquid (water, alcohol, lactose, etc.) which is also known as a "mother tincture". More often professional homeopaths tender to use highly diluted liquid because the more diluted the mixture, the more power it has to heal the disease. Every homeopathic medicine stimulates the healing mechanism of the body. Homeopathic diagnosis includes physical symptoms, emotional and psychological conditions, and a person's nature. A person's habits, family background, approach toward work, etc. can be considered while going for therapy. The right treatment will take all of these concerns into account and personalize each remedy and diagnosis.

FAQs

1 Is Homeopathy Officially Regulated?

No. Homeopathy is not part of any legislature in the USA as they are regulated by their relevant media professional body (For example, General Media Council).

How Long Is Homeopathy Medicine Valid? 2

The shelf life of homeopaths should not exceed 5 years, irrespective of the source of the drug.

3 Is There Any Side-effect Of Homeopathy Medicines?

After an interaction with other drugs, it can cause side effects as negative health effects of homeopathy medicines are reported.

Can Homeopathy Cure Diseases Permanently? 4

There is no scientific evidence available that any disease can be cured permanently. However, the intensity of pain is possible to reduce.

5 How Many Medicines Are Available In Homeopathy?

As homeopathy has been there for around 200 years and there are approximately 2000 remedies available in homeopathy.

Law of Similars

If you are planning to visit a homeopath anytime soon, he/she will ask you questions regarding your well-being, current emotional state of mind, diet, lifestyle, etc. to make a proper diagnosis. It will give homeopaths an idea about the course of treatment which may include pills, capsules, or tinctures. You may have to attend two or more follow-up appointments so that the impacts of medicines on your health will be assessed. All homeopathic medicines are tested on humans by a method that is similar to clinical trials before the news which is known as the "law of similars". The ethical and clinical use of medicines is governed by specific tried and tested laws and principles.

List of Homeopathy Medicines for Your Rescue:

As you have understood, the importance of homeopathy medicines, here we have mentioned basic information about them. These are the medicines you should keep at your home:

- **Allium Cepa (Onion):** It is a typical remedy for the common cold and fever and prevents tearing of the eyes and dripping of the nose.
- **Arnica (Topical):** It is applied externally along with gels, ointments, or in spray form. Arnica can heal skin infections.
- **Arnica (Mountain daisy):** This is the most preferable remedy used to heal injuries of sportspersons and used in first aid kits. It can speed up recovery and reduce injury pains.
- **Chamomilla (Chamomille):** It is the best remedy for infants which helps them sleep better and hence many parents owe their sleep to Chamomilla.
- **Hypericum (St. John's wort):** It is the first choice for homeopaths to recover nerve pain. Any back pain inquiry can be treated with Hypericum.
- **Ignatia (St. Ignatius bean):** It is one of the leading homeopathic medicine to treat anxiety, depression, acute grief, etc. Some psychiatrists also recommend it to their patients.
- **Rhus tox (Poison ivy):** It is the most common solution for strains and sprains. Physiotherapists recommend it when a person experiences 'rusty gate' syndrome. The syndrome slows down the initial movements of a person.
- **Nux vomica (Poison nut):** It is a common remedy for overeating or over-drinking alcohol.
- **Pulsatilla (Windflower):** It is given to both women and children who have excessive heat in their bodies.
- **Magnesia phosphoric (Phosphate of magnesia):** It is the most recommendable remedy to treat menstrual cramps and make women feel relieved.

Learning to understand homeopathy and knowing about its applications in daily life is an interesting thing to do. Instead of going to the doctor for small medical issues, it is always good to carry homeopathy medicines in your pocket. If you wish to give homeopathy a try then you can go for the above-mentioned remedies. They will help you to get relief from severe pains.

We hope you enjoyed reading our article regarding homeopathy medicines and understood their basics. Next time if you are willing to meet a homeopath, do not forget to refer to this article for necessary information.

THE 'NOBLE' WINNERS

HOW SVANTE PÄÄBO

REVOLUTIONIZED THE WAY WE UNDERSTOOD HUMAN RACE?

H

Have you ever wondered how we humans came into existence? Well, at least some of you have thought about this. And we don't blame you. The how's, when's, and where's of humanity are truly fascinating, the deeper you delve into it.

Svante Pääbo, the Nobel Prize winner in Physiology or Medicine, also had a very curious mind. He also had some questions about the origins of humanity. Building upon his curiosity, Pääbo pioneered research to achieve something that was deemed impossible—he successfully recovered and sequenced the genome of the Neanderthal, an extinct relative of modern-day humans. In this research, among other things, he has offered insights and also shed light on the genetic evolution of modern-day humans.

In addition to that, Pääbo's seminal research also gave birth to paleogenomics, a new scientific discipline in its entirety. This particular study revealed the factors that distinguish us living humans from extinct hominins, which additionally helped us understand what makes us humans so unique.

In this article, we are taking you on a trip of Pääbo's life journey and giving you a glimpse into things that led to him winning the Nobel Prize in Physiology or Medicine. That's not it, we have also included some bonus excerpts from his personal life. As a fellow homo sapien, this will surely tickle your curiosity while giving you more knowledge about humankind.

Notable Timelines before the Nobel

1955: The Birth Year

Born in 1955, Svante Pääbo got his initial education and Ph.D. in Sweden. As a graduate student of medicine and molecular biology, the idea that ancient tissues might preserve DNA always captivated him. During those days, he made several attempts trying to detect DNA in Egyptian mummies. In the beginning, he thought he was successful in his objective, however, he later realized what he observed might not be authentic ancient DNA, and it could just be a recent contaminant.

Even today, contamination remains one of the major worries in ancient DNA research. Keeping all these concerns in mind, Pääbo's team had to take great care as they were trying to keep contamination at bay to limit the chances.

1986-1990: Getting that much-needed jump

Svante Pääbo received his Ph.D. in the year 1986, and soon in 1987, he started working as a postdoctoral researcher with the renowned Berkley biochemist Allan Wilson at his laboratory. However, in the late 1980s, his work got a huge jump due to the development of polymerase chain reaction technology, which made repeated replication of small fragments of DNA possible.

1991-1997: Years of Neanderthal and more

Furthermore, during these years, he reached out to museums in Germany asking for Neanderthal bone samples, to sequence the DNA contained inside the bones. In the year 1997, it became known that a large chunk of DNA could be recovered from bones as old as 50,000 or more. At the start, the work was dependent on mitochondrial DNA—which is largely present in the

cells compared to DNA from the nucleus, because of that, it is preserved more. Additionally, the study showed that Neanderthal and humans were two separate groups that were separated about 50,000 years ago.

2006: The sequencing begins

Pääbo started taking steps to sequence the entire Neanderthal genome in the year 2006. Within just a few years, he along with his team achieved success while managing to sequence more than 4 billion base pairs. Moreover, the comparison of Neanderthal and modern human genomes showed that individuals in Asia and Europe derive 1% to 4% ancestry from Neanderthals.

2008: Significance of Denisovans

As the year 2008 arrived, Svante Pääbo and his team recovered DNA from a finger bone fragment in a Siberian cave, which revealed an unknown ancestral human population that is currently known as Denisovans. Here, the genetic results showcased that the Modern Tibetan population may have acquired its high-altitude adaptations from the distant Denisovan ancestors.

The DNA of Making the Impossible, Possible

It didn't take Svante Pääbo a lot of time to realize the severity of technical challenges while studying the DNA of Neanderthals. One such challenge is the DNA modification process—as time goes by the DNA modifies chemically and reduces into short fragments. After a while, it reaches a point where only the hints of DNA remain, it could also be contaminated with the DNA from bacteria and contemporary humans.

Similarly, the mitochondrial genome is tiny and has very little genetic information in the cell. However, it is present in thousands of copies, thus increasing the possibility of success. Pääbo, with his well-polished methods, was able to sequence a region of Mitochondrial DNA from a bone as old as 40,000 years. This allowed us to access a sequence from an extinct relative for the first time, something that was considered close to impossible.

Not just a thing of the past

Studies have suggested that Neanderthal heritage, along with our past, also has a big influence on our present. One such example is the impact of genes on our immune system and the way our system reacts to various pathogens.

More Ways of Neanderthal Affecting Humans

In a shocking discovery, Svante Pääbo noticed that the people inheriting a particular Neanderthal variant were more likely to die of COVID if infected. According to estimations, the said Neanderthal variant is responsible for 1.1 million extra coronavirus deaths. Additionally, Pääbo also established that people with certain Neanderthal variants are more sensitive to pain, and as a result, age faster.

Not the first Nobel Prize in the family

Did you know? Karl Sune Detlof Bergström, father of Svante Pääbo, is also a winner of the Nobel Prize. He won it in 1982 in the field of Physiology or Medicine, just like his son Pääbo, who won the Prize in 2022. When Karl won his Nobel Prize, not many knew that he was Svante Pääbo's father. Although, People not knowing their father-son relation is not really surprising, considering they both had different surnames. However, his father winning the Nobel Prize had little to no influence on his own scientific endeavors. Interestingly, it was Karin, his mother, who always encouraged his curiosity. As a result, she had a huge influence on him and his life path. Her firm support when Pääbo switched from medicine to natural sciences is one such example. Unfortunately, Karin passed away in 2013. Pääbo says she would have been “Proud and thrilled” about him winning the Nobel Prize.

Wait, It's Not a Prank?

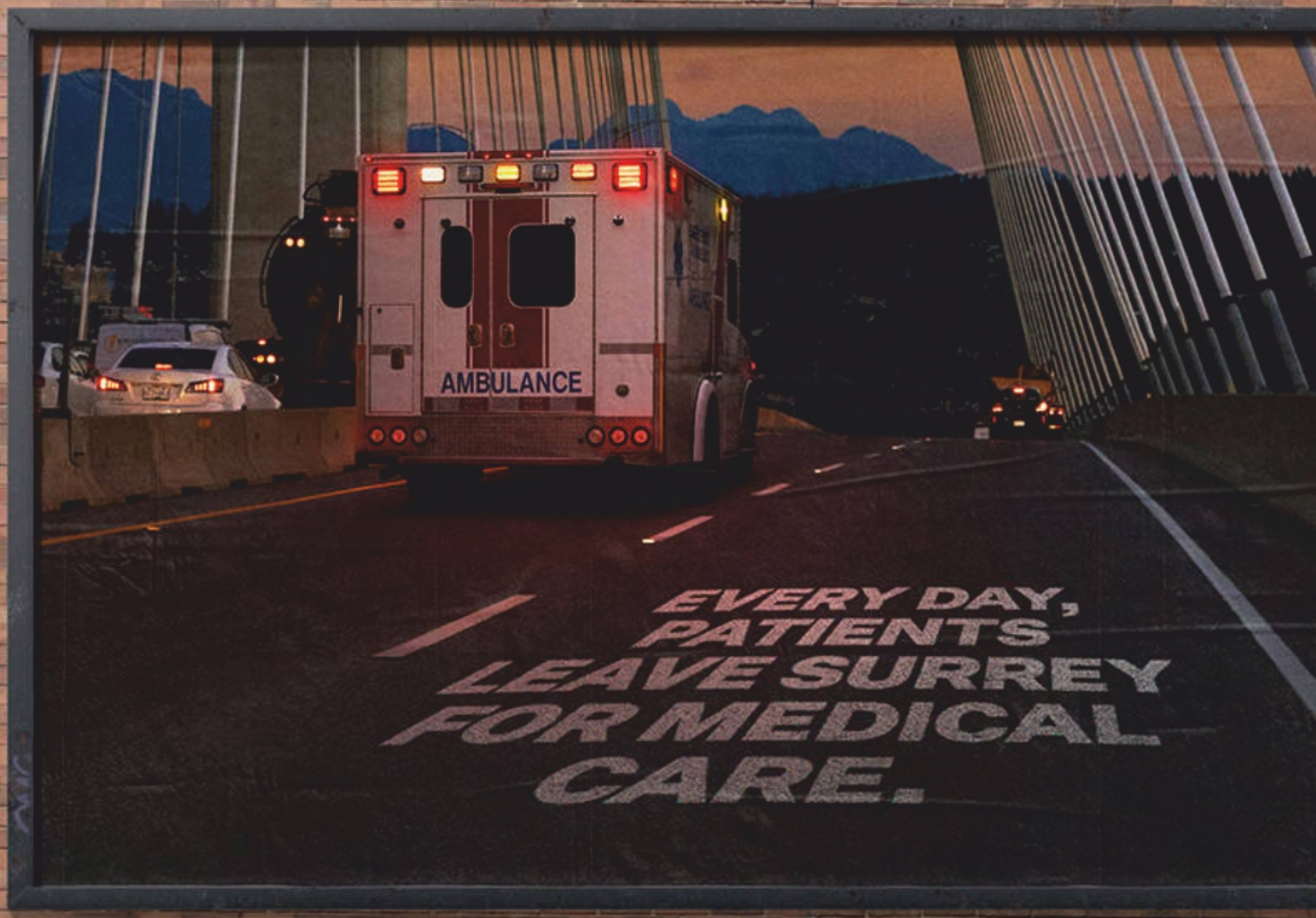
Funnily, when Pääbo got the call that he has won the Nobel Prize, he thought it was a prank call regarding his summer house. As seen on the Nobel website, Svante Pääbo says “So I was just gulping down the last cup of tea to go and pick up my daughter at her nanny where she has had an overnight stay,” He adds—“And then I got this call from Sweden and I of course thought it had something to do with our little summer house … I thought the lawn mower had broken down or something.

Although winning prizes is not an uncommon event in Pääbo's life, he never thought he would win a Nobel Prize.

A step closer to finding answers

Today, Svante Pääbo is considered one of the founders of paleogenetics. And His research has paved the way for a deeper understanding of the origins, evolution, adaptation, and migration of humans. On the other hand, his overall influence on the science field cannot be overlooked, with many scientists, professors, and groups using Pääbo's tools for their own scientific work.

SVANTE PÄÄBO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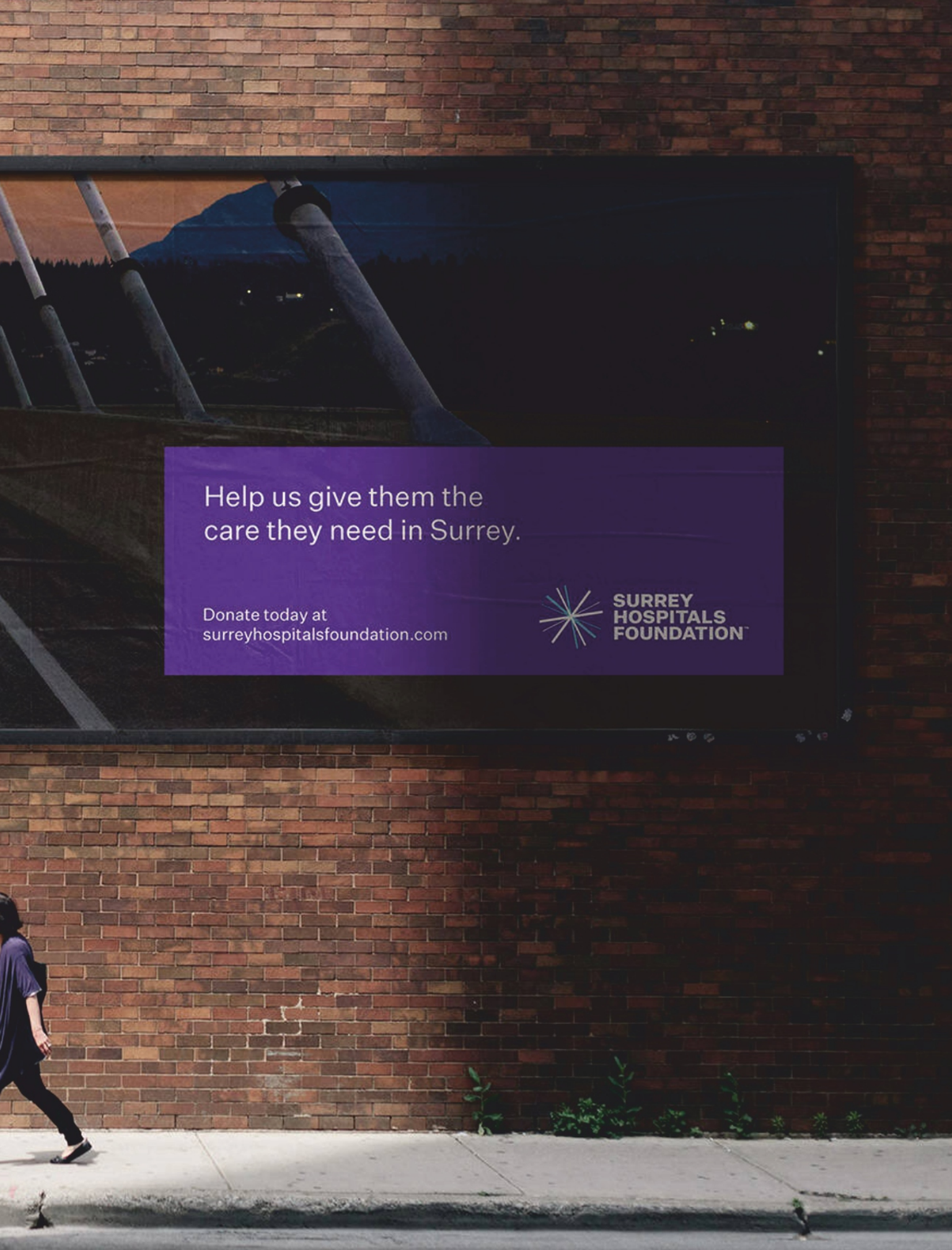
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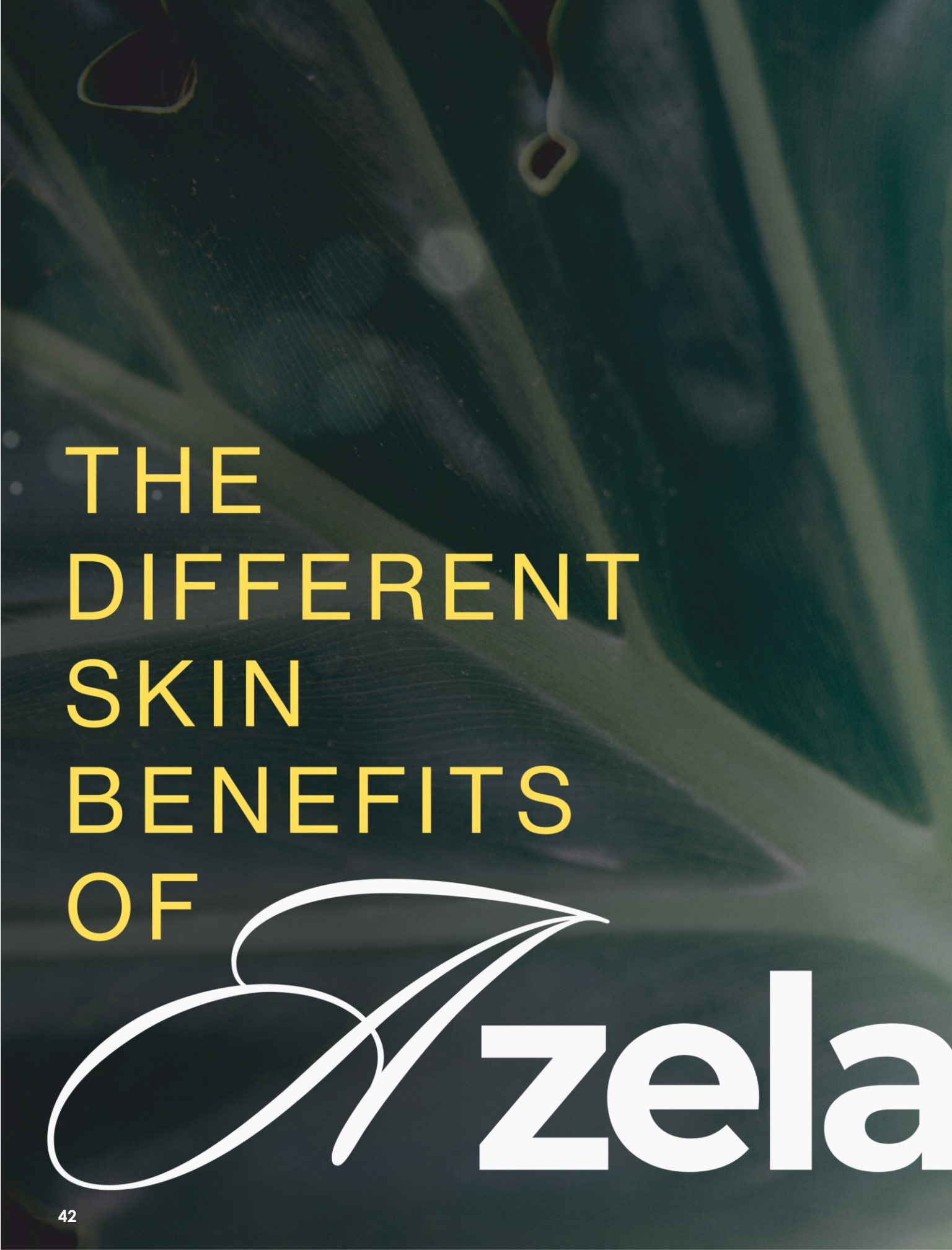

THE
DIFFERENT
SKIN
BENEFITS
OF
zela

ic Acid

Azelaic acid has gained significant attention in the skincare industry for its remarkable benefits in addressing various skin concerns. Known for its versatility and effectiveness, azelaic acid offers a wide range of benefits, making it a sought-after ingredient in many skincare formulations. Azelaic acid is a bit ignored especially in the skincare industry which is a safe skincare element that can be used.

In this article, we will explore the different skin benefits of azelaic acid. We will also try to understand why it has become a popular choice among skincare enthusiasts.

What is Azelaic acid?

It has been in use for more than 35 years. The benefits of azelaic acid include anti-microbial and anti-inflammatory elements which give it its characteristics. This is found in animal products and grains like wheat, barley, etc. One of the benefits of azelaic acid is available for sale in the form of gel, creams, or foam. A doctor's prescription is needed. It is available at your nearest chemist's shop. Without a prescription Azelaic acid will be given at the power of 12% and with a doctor's prescription it will be given at 15% power.

Benefits of Azelaic acid:

1. Has anti-aging properties:

One of the many benefits of azelaic acid is it is very safe and smooth on the skin to use. It has little or no side effects when used on the skin for women. Collagen is a structural protein that keeps the skin supple and youthful. By increasing collagen synthesis, azelaic acid aids in reducing the appearance of fine lines, wrinkles, and other signs of aging. It also helps to protect the skin from oxidative stress, which contributes to premature aging.

2. Can be used during pregnancy:

The benefits of azelaic acid also include the use of the same during pregnancy. Vulgaris is a condition common in pregnant women. Due to its anti-inflammatory and anti-microbial elements, it is safe to use during pregnancy. This is only one of the acids that are allowed for pregnant ladies to use. It will not cause any harm to the mother or the baby. It is also recommended by doctors to use it when required.

3. Helps Reduce Acne Breakouts:

One of the prominent benefits of azelaic acid is its ability to combat acne. It works by inhibiting the growth of bacteria called Propionibacterium acnes, which is a major contributor to acne development. Additionally, azelaic acid helps to normalize the shedding of dead skin cells, preventing clogged pores and reducing the formation of blackheads and whiteheads. Its anti-inflammatory properties also aid in calming redness and swelling associated with acne breakouts.

4. Controls Rosacea Symptoms:

Rosacea is a chronic skin condition that leads to redness, flushing, and the appearance of visible blood vessels. Azelaic acid has demonstrated its efficacy in managing the symptoms of rosacea. It works by reducing inflammation and minimizing the dilation of blood vessels in the skin, resulting in a calmer complexion. Furthermore, it can help control the papules and pustules associated with rosacea, promoting a clearer and more balanced skin appearance. The swelling and redness of the skin are reduced with azelaic acid.

5. Lightens Hyperpigmentation and Melasma:

Azelaic acid has been proven effective in reducing hyperpigmentation, including post-inflammatory hyperpigmentation (PIH) caused by acne, sun damage, or other skin traumas. It inhibits the production of melanin, the pigment responsible for skin color, thereby helping to fade dark spots and even out skin tone. Furthermore, it has shown promising results in treating melasma, a condition characterized by brown or gray-brown patches on the skin.

Skin-specific benefits of azelaic acid:

1. Equal Skin tone:

It enhances the natural coloring of the skin. It restricts an enzyme called tyrosinase that makes dark patches on the skin and results in hyperpigmentation. That is why azelaic acid is recommended by doctors for acne breakout, melasma, and the marks which remain after acne is gone or post-acne scars.

2. Soothes inflammation:

Azelaic acid neutralizes free radicals that cause the onset of inflammation. It soothes the skin with its calming effect. The redness on the skin is also reduced due to the same. It acts beneficial for those with mild to moderate acne issues. It isn't advised for people with cystic acne until the doctor has advised them to do so. Such patients should approach a certified dermatologist for further care and treatment.

Side effects of azelaic acid:

Can be irritating when combined:

When azelaic acid is combined and used with benzoyl peroxide and retinoids as a mixture it can cause itching or irritation. The skin may also turn too dry and start to itch due to dryness.

Use of it:

It should be used once or twice a day. People who have sensitive skin may use it once. If it doesn't show signs of irritation on their skin they may opt for applying it twice gradually. Immediate application twice isn't recommended.

Use sunscreen when applied:

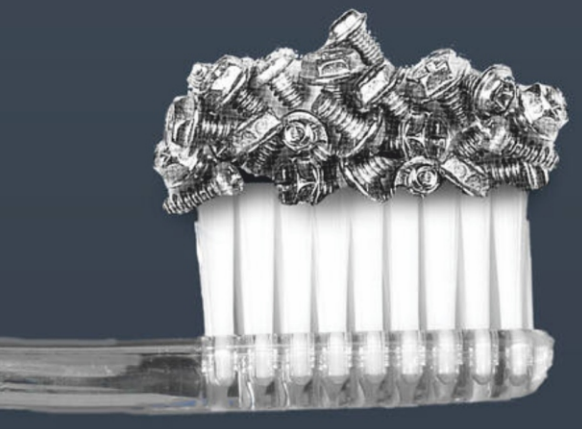
When you've applied the azelaic acid it is important to apply sunscreen when you go out in the broad daylight. Acne or melasma can aggravate if exposed to the sun when using azelaic acid.

Can irritate a bit on first use:

If you're not well-versed with acids on your skin, applying it for the first time will cause a bit of irritation. As you've never applied anything like this before, you can experience a bit of itching or rashes on the very first use only. If it persists during the next use too, consult a dermatologist immediately.

Conclusion:

As we've seen many benefits of azelaic acid, we can conclude that it is one of the safest ones to use. It can be used during pregnancies, applied with sunscreens and it gives even skin tone too. What more one can ask for? A skin will most probably become better and better with the use of azelaic acid. It is only requested for sensitive-skinned people, to be cautious when using it. Even for first-timers, it can itch just at the start. Doctors have recommended this acid to be the safest among all other acids. If any problem is faced, you can always visit your nearest dermatologist at any given time.



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